

NASA TECH BRIEF

Marshall Space Flight Center



NASA Tech Briefs announce new technology derived from the U.S. space program. They are issued to encourage commercial application. Tech Briefs are available on a subscription basis from the National Technical Information Service, Springfield, Virginia 22151. Requests for individual copies or questions relating to the Tech Brief program may be directed to the Technology Utilization Office, NASA, Code KT, Washington, D.C. 20546.

Space Ultrareliable Modular Computer (SUMC) Instruction Simulator

The problem:

It was necessary to test space ultrareliable modular computers (SUMC) on host computers.

The solution:

A simulator was designed to facilitate the testing of the SUMC on host computers.

How it's done:

The requirement of operation on several host computers has led to a highly modular program structure. The simulator has been constructed as a set of quasi-independent modules, regulated by one control module. All machine-dependent functions have been resolved such that the simulation package is as machine independent as possible.

Notes:

1. This program was written in FORTRAN IV for any host computer.
2. Inquiries concerning this program should be directed to:

COSMIC
112 Barrow Hall
University of Georgia
Athens, Georgia 30601
Reference: MFS-22697

Source: R. T. Curran and
W. A. Hornfeck of
Computer Sciences Corp.
under contract to
Marshall Space Flight Center
(MFS-22697)